

of shields from head to dorsal. Tail tetrahedral, tapering, terminating in a moderately large caudal fin. The top surface is considerably broader than the lower one; it has about thirty-four rings, of which about sixteen are occupied by the egg-pouch in males. The dorsal stands on seven tail-rings, and equals the length from extremity of snout to anterior of opercles, measured on the lower surface of the head; it has twenty-six rays. The lateral line joins the upper surface of the tail at the end of the dorsal fin. *Colour*: blackish, with more or less regular series of white points, brown spots, and irregular patches.

Length $4\frac{1}{2}$ inches.

Numerous specimens were found at the confluence of the Oued Cherif and the Oued Bou-Hamdan, in the province of Constantine (twelve miles above Guelma, and sixty miles from the sea).

XLVIII.—*Notes on Holopus and Pentacrinus.*

By Dr. J. E. GRAY, F.R.S.

MR. RAWSON W. RAWSON, C.B., the Governor of Barbadoes, has kindly sent me the following observation:—"I have procured a specimen of a *Pentacrinus* from the north of the Island of Barbadoes, dredged or, rather, picked up in about 5 fathoms water. I enclose a sketch (see figure). It is ink-black, a portion broken so as to show the interior of the contracted armlets and the Pentacrininal formation of the mouth or entrance of the central canals. Do you know what it is? I am under the impression of having seen an engraving of such a zoophyte, but cannot find it."



There can be no doubt that the animal here referred to is very similar to the crinoid described by M. d'Orbigny at the Académie des Sciences, Feb. 27, 1837. The paper is printed at length in the 'Magasin de Zoologie' for the same year, with a plate, under the name of *Holopus Rangii*.

There is a short notice of the characters of the genus in the 'Annales des Sciences Naturelles,' vol. viii. p. 123, and in Wiegmann's 'Archiv' for 1839.

The genus is also noticed in an "Appendix to the History of Crinoids" in Dujardin and Hupé's 'Histoire Naturelle des Zoophytes et Echinodermes,' p.217. These authors observe:—"Le seul individu observé avait été rapporté de la Martinique par Sander-Rang et, pour cette raison, nommé *Holopus Rangii*."

"Il était censé avoir été pêché vivant, mais la description a été faite uniquement sur le squelette pierreux, haut de 80 millimètres environ, et on n'a rien dit de la structure intime de ce squelette, d'où l'on eût pu conclure sa nature échinodermique. Aucun autre observateur ne l'a étudié après D'Orbigny, et nous-mêmes il nous a été impossible de le voir dans la collection de ce célèbre paléontologiste, achetée par le Muséum d'Histoire Naturelle. Aussi, d'après la description et la figure* qui ont été reproduites dans les 'Annales des Sciences Naturelles' et dans les 'Archiv für Naturgeschichte' (1839), sommes-nous fortement tenté d'y voir toute autre chose qu'un échinoderme, un cirrhipède, par exemple. Cependant, la plupart des zoologistes ont admis non-seulement l'*Holopus* comme un genre d'échinodermes-crinoides, mais encore comme le type d'une famille distincte qu'on appellerait les Holopides (*Holopidae*). Mais nulle part ailleurs, chez les Crinoides, on n'a vu, comme chez les Cirrhipèdes, au lieu d'une tige articulée, un pied creux contenant les viscères. Nous croyons donc qu'il faut attendre de nouvelles observations" (p. 217).

These observations must have been written from a very indistinct recollection of M. d'Orbigny's excellent and detailed paper and plate; for he not only figures the exterior of the animal, but also gives a longitudinal section of it, showing the inside of the arms, the mouth and the visceral cavity, details of the arms and armlets, and the articulating surfaces of which they are composed. Nothing like these articulations has ever been found in any cirriped.

Mr. Rawson, knowing nothing of any doubt on this subject having been expressed, at once recognized it as a crinoid, showing the justice of Rang's position of it; and the organization of the crinoid is so unlike that of any recent or fossil genera I know, that I think authors have been justified in forming it into a separate family, characterized by its bag-like body covered with a continuous calcareous coat, and attached by its outer surface to submarine bodies.

There are certain points in which the form of the arm in Mr. Rawson's figure is very unlike that of the species from Martinique which D'Orbigny has called *H. Rangii*. I would

* I can find no figure of the genus in my copy of the 'Annales.'

therefore propose to distinguish the Barbadoes specimen by the name *H. Rawsoni*, and hope very shortly to be able to give a more detailed description of this most interesting recent discovery in crinoidal genera.

Mr. Rawson observes:—"I have only procured one specimen of the *Pentacrinus caput-medusæ*, and it was the first; I am therefore more uncertain about the place where it was procured than I am about the habitat of the *Pentacrinus Mülleri*. But I believe that they are all procured on the same bank, which, instead of five or six miles from the shore, as I was first informed, cannot be more than a mile, within the hundred-fathom line."

XLIX.—On the Coleoptera of St. Helena.

By T. VERNON WOLLASTON, M.A., F.L.S.

SINCE the publication of my memoir on the Coleoptera of St. Helena, two years ago, another batch has been placed in my hands by Mr. J. C. Melliss, who has lately returned from the island, and has brought with him a small additional collection, of considerable interest. Although a very large proportion of this last consignment is made up of species which are manifestly naturalized (having been taken, clearly, in and about the town), there is nevertheless a certain modicum of unmistakably endemic forms; and these, along with a few others of more doubtful origin, I propose to describe in the present paper.

The total number of species in the collection which has lately been entrusted to me by Mr. Melliss is 39; and of these as many as 21 were not included in my enumeration in 1869. Amongst the 21 additions, however, to the catalogue, there are *ten* which we may be quite certain have found their way into the island through the medium of commerce, and have therefore no connexion whatever with the aboriginal fauna. Such species as these figure in the local lists of nearly every civilized country; and as they are invariably admitted, on the tacit understanding that they have unquestionably been naturalized, we can scarcely refuse them a place in the St.-Helena enumeration. The ten to which I allude are as follows:—

Carpophilus dimidiatus.
— *hemipterus*.
Trogosita mauritanica.
Cryptophagus badius.
— *gracilipes*.

Silvanus surinamensis.
Curtomerus pilicornis.
Coptops bidens.
Homalota coriaria.
Philonthus longicornis.